

# Work Order ID 87854

July-17-12 7:58:16 AM

**\*87854\***

Page 1

Item ID: D407-558-045

Accept

**\*N900040100\***

Setup Start **\*NS1\***

Revision ID:

Stop **\*NS2\***

Item Name: Single Cargo Mirror Assembly, 6 inch Round

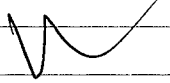
Start Date: 7/17/12 Start Qty: 2.00 **\*2\***

Cust Item ID:

Required Date: 8/24/12 Req'd Qty: 2.00 **\*2\***

Customer:

Reference:

Approvals: Process Plan:  Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_  
QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Run Start **\*NR1\***

Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

Draw Nbr	Revision Nbr
DSI 9436	A
IIN 206-558	REV C

100

**\*100\***

DC

Document Control

DOCUMENT CONTROL

Memo

Photocopy bluefile and type labels as per PPP D407-558-045 and DSI 9436  
CHG003

0.00

0.00

110

**\*110\***

Small Fab

Small Fab

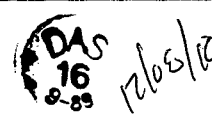
Small Fab

Memo

Assemble as per Dwg D206-558

0.00

0.00



Pto →

2



FF  
12-08-09

NCR: ☒ Yes ☐ No

## WORK ORDER NON-CONFORMANCE / UPDATE

DQA: \_\_\_\_\_ Date: \_\_\_\_\_

QA Closed: \_\_\_\_\_ Date: \_\_\_\_\_

Work Order: <u>87854</u>  Part No. <u>D7065</u>  NCR No. _____	<b>DISPOSITION</b>  Rework <input type="checkbox"/> Scrap <input checked="" type="checkbox"/> Use-as-is <input type="checkbox"/> Work Order Update <input type="checkbox"/>	<b>AGAINST DEPARTMENT/PROCESS</b>  <table style="width:100%;"> <tr> <td>Skid-tube <input type="checkbox"/></td> <td>Crosstube <input type="checkbox"/></td> <td>Water Jet <input type="checkbox"/></td> <td>Engineering <input type="checkbox"/></td> </tr> <tr> <td>Machining <input type="checkbox"/></td> <td>Small Fab <input checked="" type="checkbox"/></td> <td>Prod. Eng. Coord. <input type="checkbox"/></td> <td>Quality <input type="checkbox"/></td> </tr> <tr> <td>Thermoforming <input type="checkbox"/></td> <td>Finishing <input type="checkbox"/></td> <td>Rec/Store/Packaging <input type="checkbox"/></td> <td>Other <input type="checkbox"/></td> </tr> <tr> <td>Large Fab <input type="checkbox"/></td> <td>Composite <input type="checkbox"/></td> <td>Supplier <input type="checkbox"/></td> <td></td> </tr> </table>	Skid-tube <input type="checkbox"/>	Crosstube <input type="checkbox"/>	Water Jet <input type="checkbox"/>	Engineering <input type="checkbox"/>	Machining <input type="checkbox"/>	Small Fab <input checked="" type="checkbox"/>	Prod. Eng. Coord. <input type="checkbox"/>	Quality <input type="checkbox"/>	Thermoforming <input type="checkbox"/>	Finishing <input type="checkbox"/>	Rec/Store/Packaging <input type="checkbox"/>	Other <input type="checkbox"/>	Large Fab <input type="checkbox"/>	Composite <input type="checkbox"/>	Supplier <input type="checkbox"/>	
Skid-tube <input type="checkbox"/>	Crosstube <input type="checkbox"/>	Water Jet <input type="checkbox"/>	Engineering <input type="checkbox"/>															
Machining <input type="checkbox"/>	Small Fab <input checked="" type="checkbox"/>	Prod. Eng. Coord. <input type="checkbox"/>	Quality <input type="checkbox"/>															
Thermoforming <input type="checkbox"/>	Finishing <input type="checkbox"/>	Rec/Store/Packaging <input type="checkbox"/>	Other <input type="checkbox"/>															
Large Fab <input type="checkbox"/>	Composite <input type="checkbox"/>	Supplier <input type="checkbox"/>																

Root Cause	Date	Step	Qty	Description of work order update or Non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Doc/Data <input type="checkbox"/> Equip/Tooling <input checked="" type="checkbox"/> Operator <input type="checkbox"/> Material <input type="checkbox"/> Setup <input type="checkbox"/> Other <input type="checkbox"/> Process <input checked="" type="checkbox"/> Supplier <input type="checkbox"/> Training <input type="checkbox"/> Unapproved <input type="checkbox"/>	12/08/09	110	1	Trouble installing D2057 <del>set</del> scored Tube head <del>Repair, scrap/destroyed</del>  R.e. Plug @ mt. tol. and tubing is it plug in	DAS 16 9-09  057047 12/08/09	SCRAP D7065 AND Replu unable to Ps touch up		DAS 16 9-09  12/08/09	DAS 16 9-09  057042 12/08/09

## FAULT CATEGORY

<b>Landing Gear</b> <input type="checkbox"/> Bending <input type="checkbox"/> Centre Not Concentric to O/S <input type="checkbox"/> Cracks <input type="checkbox"/> Crushed/Crimped <input type="checkbox"/> Cuffs <input type="checkbox"/> Heat Treat <input type="checkbox"/> Inspection Strip in Tube <input type="checkbox"/> Ripples in Bend <input type="checkbox"/> Torque Waves in Extrusion <input type="checkbox"/> Turning Sequence <input type="checkbox"/> Wave/Twist in Tube	<b>General</b> <input type="checkbox"/> Bend <input type="checkbox"/> BOM/Route <input checked="" type="checkbox"/> Broken/Damaged <input type="checkbox"/> Burrs <input type="checkbox"/> Contamination <input type="checkbox"/> Countersink <input type="checkbox"/> Cut Too Short <input type="checkbox"/> Drill Holes <input type="checkbox"/> Drawing <input type="checkbox"/> Finish <input type="checkbox"/> Folio	<input type="checkbox"/> Grain <input checked="" type="checkbox"/> Hardware <input type="checkbox"/> Inspection Incomplete <input type="checkbox"/> Instructions Incomplete/Unclear <input type="checkbox"/> Maintenance <input type="checkbox"/> Mislabeled <input type="checkbox"/> Misread <input type="checkbox"/> Offset <input type="checkbox"/> Out of Calibration <input type="checkbox"/> Out of Sequence <input type="checkbox"/> Outside Dimensions
<input type="checkbox"/> Ovalized <input type="checkbox"/> Over/Under tolerance <input type="checkbox"/> Part Incorrect <input type="checkbox"/> Part Lost/Missing <input type="checkbox"/> Part Moved <input type="checkbox"/> Positioned Wrong <input type="checkbox"/> Power Loss/Surge		
<input checked="" type="checkbox"/> Pressure/Forced <input type="checkbox"/> Temperature/Cure <input type="checkbox"/> Weld <input type="checkbox"/> Wrong Stock Pulled  <input type="checkbox"/> Other		

# Work Order ID 87854

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Item ID: D407-558-045

Accept

**\*N900040100\***

Setup Start **\*NS1\***

Revision ID:

Stop **\*NS2\***

Item Name: Single Cargo Mirror Assembly, 6 inch Round

Start Date: 7/17/12 Start Qty: 2.00 **\*2\***

Cust Item ID:

Required Date: 8/24/12 Req'd Qty: 2.00 **\*2\***

Customer:

Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

Run Start **\*NR1\***

QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
120	QC5- Inspect part completeness to step on W/O	0.00							
<b>*120*</b>									
QC	Memo	0.00	Smb			2			
Quality Control			12.8.09	17/06/10					
125	Pick Kit	0.00							
<b>*125*</b>									
Packaging	Memo	0.00							12/8/10
Packaging									
130	QC4- 100% Inspect kits for completeness	0.00							
<b>*130*</b>									
QC	Memo	0.00	DAS			2			
Quality Control			16	12/06/10					

# Work Order ID 87854

**\*87854\***

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July-17-12 7:58:16 AM

Item ID: D407-558-045 Accept **\*N900040100\*** Setup Start **\*NS1\***  
 Revision ID: Stop **\*NS2\***  
 Item Name: Single Cargo Mirror Assembly, 6 inch Round  
 Start Date: 7/17/12 Start Qty: 2.00 **\*2\*** Cust Item ID:  
 Required Date: 8/24/12 Req'd Qty: 2.00 **\*2\*** Customer:  
 Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
 QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
140		0.00							
<b>*140*</b>	Packaging								
Packaging	Memo	0.00							
Packaging	Identify and pack for shipping as per PPP D407-558-045 and DSI 9436								
	Location: _____								
	PPP Rev: _____								
150	QC21- Final Inspection - Work Order Release	0.00							
<b>*150*</b>									
QC	Memo	0.00							
Quality Control									

MJS 12/08/10

MNF  
12-08-10

July-17-12 7:58:14 AM

**Comments:** IPP Rev:A 09-01-15 new issue DD verified by:ec IPP Rev:B 10.06.17 added grommet  
DD verf:EC IPP REV:C 11.01.19 AS PER chg002 DD VERF:EC IPP  
REV:D 12.04.04 AS PER chg003 DD VERF:EC

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
AN3-4A Bolt		Purchased	No			125	Each	559.0000	4	8			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST350		559							
				102832		88							
				104291		4							
				104625		81			8				
				107321		8							
				117317		98							
				120308		80							
				120770		200							
AN526-1032R9 Screw		Purchased	No			125	Each	85.0000	4	8			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST347		80							
				121060		80							
				ST348		5							
				116900		4							
				117395		1							
AN960JD10 Washer	NAS1149D0363J	Purchased	No	122370		✓ 110	Each	0.0000	4	8	(2)	FF 12-0	
AN960JD10L Washer	NAS1149D0332J	Purchased	No			125	Each	0.0000	6	12	(2)	FF 12-0	
D2011-101 6" Mirror		Manufactured	No	79943		✓ 110	Each	23.0000	1	3	(2)	FF 12-0	
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST226		23							
				79943		23							

# Picklist Print

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Work Order ID: 87854

Parent Item: D407-558-045

Parent Item Name: Single Cargo Mirror Assembly, 6 inch Round

Start Date: 7/17/12

Required Date: 8/24/12


Start Qty: 2.00

Required Qty: 2.00

 **D2052**  
Mounting Bracket

Manufactured No


✓ 110 Each 28.0000

 4 ② FF 12-08-09

Location	Loc Qty	Loc Code
GA	28	
73052	3	
83341	13	
85863	12	

Manufactured No

125 Each 17.0000

 2 ② FF 12-08-09  
12/8/10

Location	Loc Qty	Loc Code
ST004	17	
58395	1	
71595	4	
79466	12	

Manufactured No


✓ 110 Each 14.0000

 4 ② FF 12-08-09

Location	Loc Qty	Loc Code
GA	14	
79836	14	

Manufactured No

✓ 110 Each 32.0000

 2 ② FF 12-08-09


Location	Loc Qty	Loc Code
GA	32	
77110	11	
85942	21	

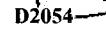
Manufactured No

✓ 110 Each 23.0000

 2 ② FF 12-08-09

Location	Loc Qty	Loc Code
GA	23	
71102	2	
71889	1	
85943	20	

 **D2053**  
Mounting Bracket

 **D2054**  
Bushing

 **D2055**  
Clamp

 **D2056**  
Bell Crank

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Shop Packet Print

Page 2

# Picklist Print

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Work Order ID: 87854

Parent Item: D407-558-045

Parent Item Name: Single Cargo Mirror Assembly, 6 inch Round

Start Date: 7/17/12

Required Date: 8/24/12

Start Qty: 2.00

Required Qty: 2.00


 D2057 Plug

Manufactured No

✓ 110 Each 12.0000

 2 (2) FF 12-08-09

Location	Loc Qty	Loc Code
GA	12	
* 71888	4	
75070	8	

 D2065 Arm

Manufactured No


✓ 110 Each 5.0000

 2 (2) FF 12-08-09

Location	Loc Qty	Loc Code
ST229	5	
73053	2	
83168	3	

Manufactured No


125 Each 13.0000

 2 ~~27-08-09~~

Location	Loc Qty	Loc Code
ST004	13	
70066	13	

Manufactured No

125 Each 25.0000

 2 ~~27-08-09~~

Location	Loc Qty	Loc Code
ST222	25	
(73054)	7	
81894	8	
82671	10	

Manufactured No

125 Each 11.0000

 2 8/12/10

Location	Loc Qty	Loc Code
ST228	11	
71205	3	
82672	2	
86133	6	

Manufactured No

Shop Packet Print

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# Picklist Print

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Page 4

Work Order ID: 87854

Parent Item: D407-558-045

Parent Item Name: Single Cargo Mirror Assembly, 6 inch Round

Start Date: 7/17/12

Required Date: 8/24/12

Start Qty: 2.00

Required Qty: 2.00

MS21042L3

Purchased No

110 Each 3,151.0000

2

4

② FF 12-08-09

Nut

Location Loc Qty Loc Code

ST300 1151

117885 32

119017 757

119075 138

121444 224

ST317 2000

122141 2000

MS21042L3

Purchased No

125 Each 3,151.0000

0

2

Nut

Location Loc Qty Loc Code

ST300 1151

117885 32

119017 757

119075 138

121444 224

ST317 2000

122141 2000

MS21919-DG5

Purchased No

125 Each 43.0000

2

4

12/8/12

Clamp

Location Loc Qty Loc Code

306 17

121652 17

ST306 26

119638 1

120731 25

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Shop Packet Print

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# Picklist Print

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Work Order ID: 87854

Parent Item: D407-558-045

Parent Item Name: Single Cargo Mirror Assembly, 6 inch Round

Start Date: 7/17/12

Required Date: 8/24/12

Start Qty: 2.00

Required Qty: 2.00

MS27039-1-18  
Screw

Purchased No

✓ 110 Each 41.0000

2

4

(2) FF 12-08-09

Location

Loc Qty

Loc Code

ST291 120308

41

115589

1

120308

15

121556

25

4

MS35489-67  
GROMMET

Purchased No

Each 107.0000

2

2

12/18/12

Location

Loc Qty

Loc Code

ST295 ~~121600~~

107

111193

7

121600

100

2

2

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Shop Packet Print

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# DART SERVICE INSTRUCTION

TO AMEND INSTALLATION INSTRUCTIONS D206-558 REV. C OR EARLIER  
AND INSTRUCTIONS FOR CONTINUED AIRWORTHINESS ICA-D206-558 REV. 0

REF: CANADIAN STC SH92-17

REF: FAA STC SH1031NE

IT HAS COME TO DART'S ATTENTION THAT A LONGER CABLE IS REQUIRED WHEN INSTALLING THE DART D206-558-041/-043 SINGLE/DUAL CARGO MIRROR ASSEMBLY ON A BHT 407 AIRCRAFT. THIS IS DUE TO THE MIRROR INSTALLATION BEING MOVED FORWARD TO PICK UP ON EXISTING SET OF SCREW HOLES ON THE BELLY OF THE AIRCRAFT AS SHOWN IN FIGURE 3 OF INSTALLATION INSTRUCTIONS D206-558 REV. C OR EARLIER.


IT IS ACCEPTABLE TO REPLACE THE D2071 CABLE ASSEMBLY WITH D2071-3 CABLE ASSEMBLY. FURTHERMORE, IT MAY BE NECESSARY TO REPLACE THE MS35489-9 GROMMET WITH MS35489-67 GROMMET TO ACCOMODATE A POSSIBLE VARIANCE IN MATERIAL THICKNESS ON A BHT 407 AIRCRAFT AS OPPOSED TO A BHT 206 AIRCRAFT.

CUSTOMERS INSTALLING EXISTING D206-558-041/-043 KIT ON A BHT 407 AIRCRAFT MUST PROCURE THE FOLLOWING KIT FROM DART:

## DSI 9436-011 PARTS LIST:

Qty -011	Part Number	Description
X	DSI 9436-011	CABLE CHANGE KIT
1	D2071-3	CABLE ASSEMBLY (REPLACES D2071)
1	MS35489-67	GROMMET (REPLACES MS35489-9)

INSTALL THE D2071-3 CABLE ASSEMBLY AND MS35489-67 GROMMET PER INSTALLATION INSTRUCTIONS D206-558 REV. C OR EARLIER AND MAINTAIN PER ICA-D206-558 REV. 0.

CANADA DEPARTMENT OF TRANSPORT AIRCRAFT CERTIFICATION BRANCH DAO # 01-O-01
APPROVED 
BY: D. SHEPHERD (DE # 02)
DATE: 08.12.04
CERT. NO.: SH92-17
ISSUE NO.: 7

A	NEW ISSUE	MB	08.12.04
REV.	DESCRIPTION	BY	DATE
DESIGN		DART AEROSPACE LTD	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO.	REV. A
MFG. APPR.		DSI 9436	SHEET 1 OF 2
APPROVED		TITLE	SCALE
DE APPR.		CABLE CHANGE	NTS
DATE	08.12.04	COPYRIGHT © 2008 BY DART AEROSPACE LTD	
THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.			

SHOP COPY  
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UNCONTROLLED COPY  
SUBJECT TO AMENDMENT  
WITHOUT NOTICE  
WORK ORDER  
NO. 87854/08/20  
2

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

FROM THIS POINT FORWARD, CUSTOMERS SHOULD ORDER D407-558-045/-047 IN LIEU OF D206-558-041/-043 WHEN PROCURING SINGLE/DUAL MIRRORS FOR BHT 407 MODELS. AMEND SECTIONS 4.0 AND 5.0 OF INSTALLATION INSTRUCTIONS D206-558 REV. C OR EARLIER AND 25.3 AND 25.4 OF ICA-D206-558 REV. 0 AS FOLLOWS:

**4.0 WEIGHT AND BALANCE (D206-558 REV. C OR EARLIER)**

**25.3 WEIGHT AND BALANCE (ICA-D206-558 REV. 0)**

Installation	Weight	LATERAL		LONGITUDINAL	
		Arm	Moment	Arm	Moment
<b>D206-558-041</b>	2.4 lb	+5.0 in	+12.0 in-lb	+14.8 in	+35.5 in-lb
Bell 206A/B/L/L1/L3/L4	1.09 Kg	+0.13 m	+0.14 m-Kg	+0.38 m	+0.41 m-Kg
<b>D206-558-043</b>	3.0 lb	0.0 in	0.0 in-lb	+14.8 in	+44.4 in-lb
Bell 206A/B/L/L1/L3/L4	1.36 Kg	0.0 m	0.0 m-Kg	+0.38 m	+0.52 m-Kg
<b>D407-558-045</b>	2.4 lb	+5.0 in	+12.0 in-lb	+14.8 in	+35.5 in-lb
Bell 407	1.09 Kg	+0.13 m	+0.14 m-Kg	+0.38 m	+0.41 m-Kg
<b>D407-558-047</b>	3.0 lb	0.0 in	0.0 in-lb	+14.8 in	+44.4 in-lb
Bell 407	1.36 Kg	0.0 m	0.0 m-Kg	+0.38 m	+0.52 m-Kg

**5.0 PARTS LIST (D206-558 REV. C OR EARLIER)**

**25.4 PARTS LIST (ICA-D206-558 REV. 0)**

Qty -041	Qty -043	Qty -045	Qty -047	Part Number	Description
X				D206-558-041	SINGLE CARGO MIRROR ASSEMBLY
	X			D206-558-043	DUAL CARGO MIRROR ASSEMBLY
		X		D407-558-045	SINGLE CARGO MIRROR ASSEMBLY
			X	D407-558-047	DUAL CARGO MIRROR ASSEMBLY
1	2	1	2	D2011-101	MIRROR ASSEMBLY
2	2	2	2	D2052	BRACKET
1	1	1	1	D2053	BRACKET
2	2	2	2	D2054	BUSHING
1	1	1	1	D2055	CLAMP
1	1	1	1	D2056	BELLCRANK ASSEMBLY
1		1		D2057	PLUG
1		1		D2065	ARM
	1		1	D2066	ARM
1	1	1	1	D2067	CONNECTOR
1	1			D2071	CABLE ASSEMBLY
		1	1	D2071-3	CABLE ASSEMBLY
1	2	1	2	D3014-1	* LOCKNUT
1	1	1	1	D3778-1	BRACKET
4	4	4	4	AN3-4A	BOLT
4	4	4	4	AN526-1032R9	SCREW
1	2	1	2	AN960JD416L	* WASHER
4	4	4	4	AN960JD10	WASHER
6	6	6	6	AN960JD10L	WASHER
3	3	3	3	MS21042-3	NUT (or MS21042L3)
2	2	2	2	MS21919DG5	CLAMP
2	2	2	2	MS27039-1-18	SCREW
1	1			MS35489-9	GROMMET
		1	1	MS35489-67	GROMMET

\* INCLUDED AS PART OF D2011-101 MIRROR ASSEMBLY

CANADA  
DEPARTMENT OF TRANSPORT  
AIRCRAFT CERTIFICATION  
BRANCH  
DAO # 01-O-01

APPROVED

BY:   
D. SHEPHERD (DE # 02)

DATE: 08.12.04  
CERT. NO.: SH92-17  
ISSUE NO.: 7

DESIGN		<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA
DRAWN		
CHECKED		DRAWING NO. REV. A
MFG. APPR.		DSI 9436 SHEET 2 OF 2
APPROVED		TITLE SCALE
DE APPR.		CABLE CHANGE NTS
DATE	08.12.04	COPYRIGHT © 2008 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.

# Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

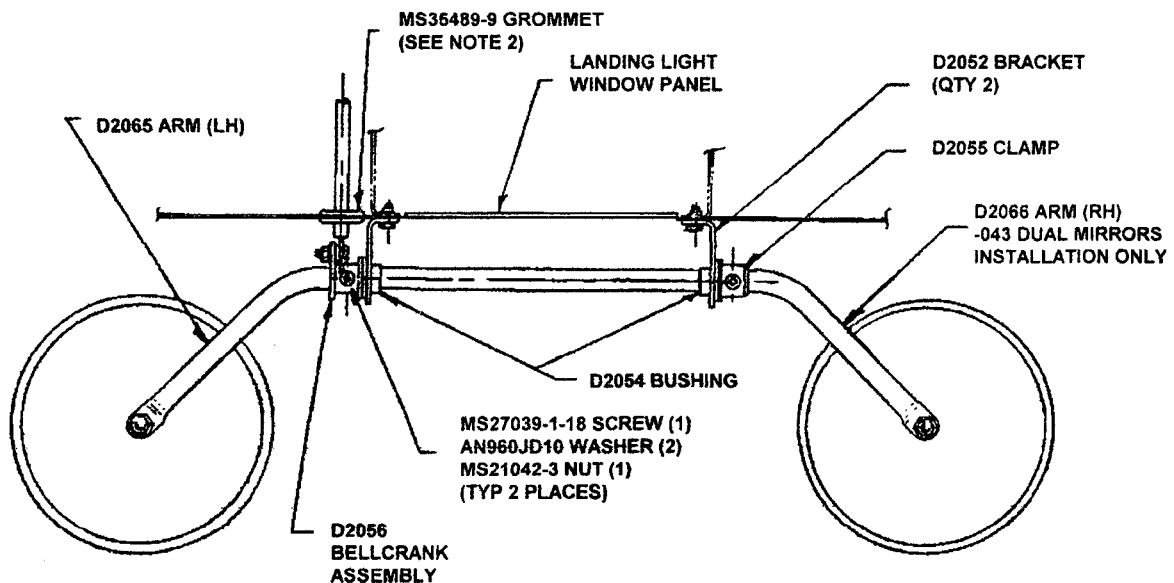
NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

**NOTE:** Date & initial all entries

### 3.0 CARGO MIRROR INSTALLATION

Install the Cargo Mirror as follows:

1. Install D206-558-041/-043 cargo mirror assembly using AN3-4A bolts and AN960JD10L washers. Pickup existing anchor nuts in 4 places.
2. Install D2067 connector onto D2056 bellcrank assembly to locate hole for MS35489-9 grommet. With the mirror in the deployed position, mark and drill  $\varnothing 0.125"$  (3.2mm) hole in landing light window panel where the grommet should be located. Open pilot hole to  $\varnothing 0.563"$  (14.3mm). Install grommet.
3. Install D2053 bracket using AN526-1032R9 screws. Pickup on existing anchor nuts.
4. Position D2071 cable as shown. Install MS21919DG5 clamps using AN526-1032R9 screws where required. Pickup existing rivnuts or anchor nuts if available.
5. Install D2071 control cable using D2067 connector. Connector should rotate freely in bellcrank when MS21042-3 nut is torqued and cable clamped



**Figure 2: – View A: Looking Aft.  
(D206-558-043 Mirror Shown)**

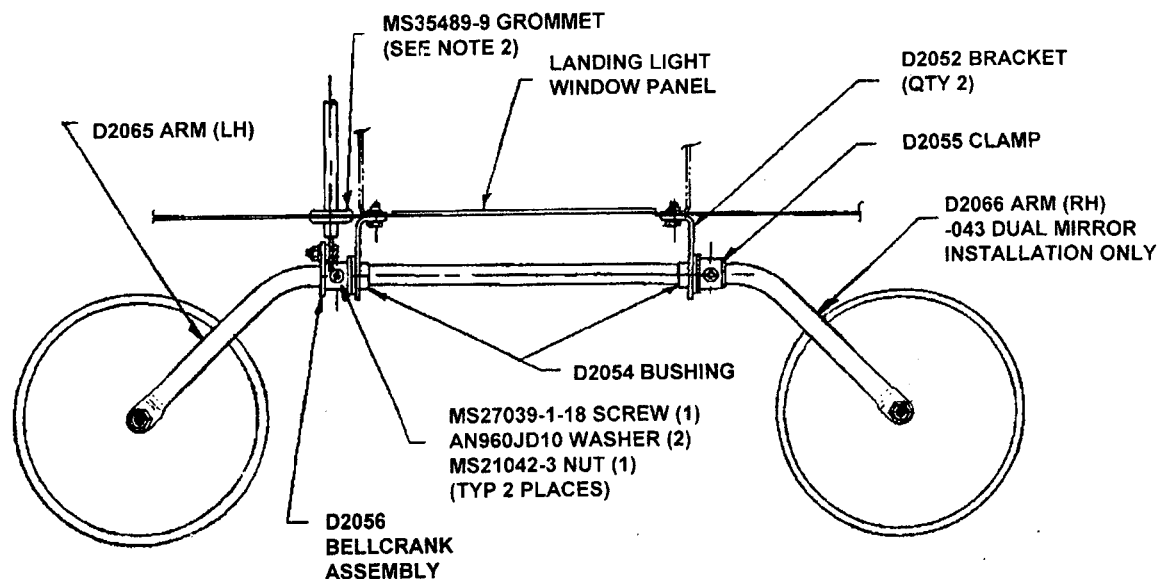


Figure 25.2 - View A: Looking Aft.  
(D206-558-043 Mirror Shown)

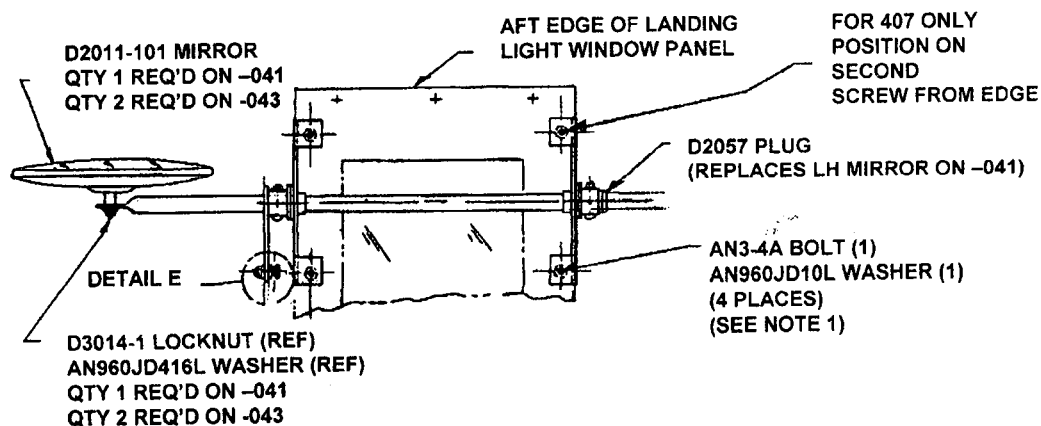
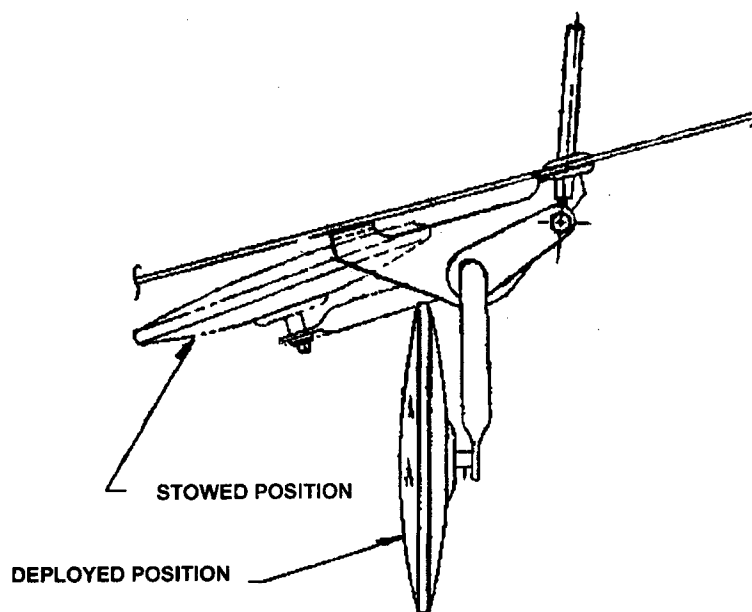


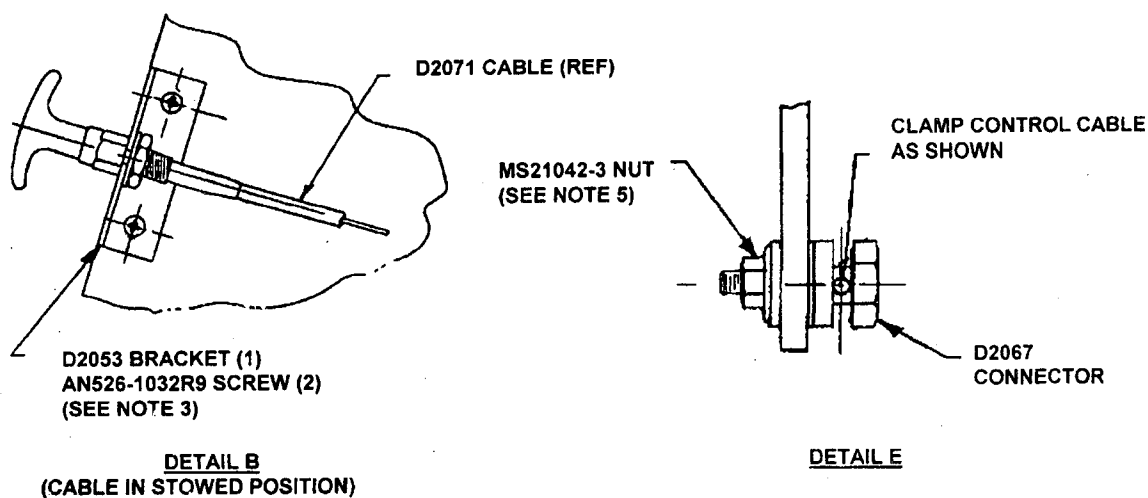
Figure 25.3 - View C: Looking Down on Mirror Installation  
(D206-558-041 Mirror Shown)

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25-00-00



**Figure 25.4 – Detail D: Looking from Side on Mirror Installation**  
(D206-558-041/-043 Mirror Shown)



**Figure 25.5 – Details B and E on Mirror Installation**  
(D206-558-041/-043 Mirror Shown)

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# REFERENCE ONLY

FROM THIS POINT FORWARD, CUSTOMERS SHOULD ORDER D407-558-045/-047 IN LIEU OF D206-558-041/-043 WHEN PROCURING SINGLE/DUAL MIRRORS FOR BHT 407 MODELS. AMEND SECTIONS 4.0 AND 5.0 OF INSTALLATION INSTRUCTIONS D206-558 REV. C OR EARLIER AND 25.3 AND 25.4 OF ICA-D206-558 REV. 0 AS FOLLOWS:

## 4.0 WEIGHT AND BALANCE (D206-558 REV. C OR EARLIER)

## 25.3 WEIGHT AND BALANCE (ICA-D206-558 REV. 0)

Installation	Weight	LATERAL		LONGITUDINAL	
		Arm	Moment	Arm	Moment
D206-558-041	2.4 lb	+5.0 in	+12.0 in-lb	+14.8 in	+35.5 in-lb
Bell 206A/B/L/L1/L3/L4	1.09 Kg	+0.13 m	+0.14 m-Kg	+0.38 m	+0.41 m-Kg
D206-558-043	3.0 lb	0.0 in	0.0 in-lb	+14.8 in	+44.4 in-lb
Bell 206A/B/L/L1/L3/L4	1.36 Kg	0.0 m	0.0 m-Kg	+0.38 m	+0.52 m-Kg
D407-558-045	2.4 lb	+5.0 in	+12.0 in-lb	+14.8 in	+35.5 in-lb
Bell 407	1.09 Kg	+0.13 in	+0.14 m-Kg	+0.38 m	+0.41 m-Kg
D407-558-047	3.0 lb	0.0 in	0.0 in-lb	+14.8 in	+44.4 in-lb
Bell 407	1.36 Kg	0.0 m	0.0 m-Kg	+0.38 m	+0.52 m-Kg

## 5.0 PARTS LIST (D206-558 REV. C OR EARLIER)

## 25.4 PARTS LIST (ICA-D206-558 REV. 0)

Qty -041	Qty -043	Qty -045	Qty -047	Part Number	Description
X				D206-558-041	SINGLE CARGO MIRROR ASSEMBLY
	X			D206-558-043	DUAL CARGO MIRROR ASSEMBLY
		X		D407-558-045	SINGLE CARGO MIRROR ASSEMBLY
			X	D407-558-047	DUAL CARGO MIRROR ASSEMBLY
1	2	1	2	D2011-101	MIRROR ASSEMBLY
2	2	2	2	D2052	BRACKET
1	1	1	1	D2053	BRACKET
2	2	2	2	D2054	BUSHING
1	1	1	1	D2055	CLAMP
1	1	1	1	D2056	BELLCRANK ASSEMBLY
1		1		D2057	PLUG
1		1		D2065	ARM
	1		1	D2066	ARM
1	1	1	1	D2067	CONNECTOR
1	1			D2071	CABLE ASSEMBLY
		1	1	D2071-3	CABLE ASSEMBLY
1	2	1	2	D3014-1	* LOCKNUT
1	1	1	1	D3778-1	BRACKET
4	4	4	4	AN3-4A	BOLT
4	4	4	4	AN526-1032R9	SCREW
1	2	1	2	AN960JD416L	* WASHER
4	4	4	4	AN960JD10	WASHER
6	6	6	6	AN960JD10L	WASHER
3	3	3	3	MS21042-3	NUT (or MS21042L3)
2	2	2	2	MS21919DG5	CLAMP
2	2	2	2	MS27039-1-18	SCREW
1	1			MS35489-9	GROMMET
		1	1	MS35489-67	GROMMET

\* INCLUDED AS PART OF D2011-101 MIRROR ASSEMBLY

CANADA  
DEPARTMENT OF TRANSPORT  
AIRCRAFT CERTIFICATION  
BRANCH  
DAO # 01-O-01

APPROVED

BY: *D. Shepherd*  
D. SHEPHERD (DE # 02)

DATE: 08.12.04  
CERT. NO.: SH92-17  
ISSUE NO.: 7

DESIGN		<b>DART AEROSPACE LTD</b>	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED	<i>[Signature]</i>	DRAWING NO.	REV. A
MFG. APPR.	<i>[Signature]</i>	DSI 9436	SHEET 2 OF 2
APPROVED	<i>[Signature]</i>	TITLE	SCALE
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